

Amendments to the Claims:

The listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claims 1.-9. (Canceled)

Claim 10. (New) A method for determining exhaust gas recirculation quantity for an internal combustion engine having exhaust gas recirculation wherein:

the exhaust gas recirculation quantity is determined based on at least one of an exhaust gas temperature, a fresh gas temperature, a fresh gas quantity, and a volumetric efficiency;

the fresh gas temperature is determined using a fresh gas temperature model that is adaptively adjusted in response to influencing parameters relevant to the fresh gas temperature;

at least one model for determining the variables fresh gas temperature, exhaust gas temperature, or volumetric efficiency comprises a basic model which is used to determine a basic value, and a correction model, which generates an output value that is used to correct the basic value when the values of variables relevant to the variable to be determined deviate from reference values of these variables.

Claim 11. (New) The method as claimed in Claim 10, wherein the fresh gas temperature model comprises:

a basic model which is used to determine a basic value for a basic temperature change; and

a correction model which generates an output value that is used to correct the basic value when the values of variables relevant to the fresh gas temperature deviate from reference value of these variables.

Claim 12. (New) The method as claimed in Claim 11, wherein at least a portion of a value determined for the fresh gas temperature is filtered.

Claim 13. (New) The method as claimed in Claim 10, wherein the exhaust gas temperature is determined by an adaptive exhaust gas temperature model comprising a basic model which is used to determine a basic value for the exhaust gas temperature, and a correction model generates an output value that which is used to correct the basic value when the values of variables relevant to the exhaust gas temperature deviate from reference values of these variables.

Claim 14. (New) The method as claimed in Claim 13, wherein at least a portion of a value determined for the exhaust gas temperature is filtered.

Claim 15. (New) The method as claimed in Claim 10, wherein a temperature of the recirculated exhaust gas is determined from the exhaust gas temperature using an adaptive exhaust gas recirculation model comprising a basic model which is used to determine a basic cooling value, and a correction model which generates an output value that is used to correct the basic value when the values of variables relevant to the temperature of the recirculated exhaust gas deviate from reference values of these variables.

Claim 16. (New) The method as claimed in Claim 15, wherein at least a portion of a temperature of the recirculated exhaust gas is filtered.

Claim 17. (New) The method as claimed in Claim 10, wherein volumetric efficiency is determined using an adaptive volumetric efficiency model comprising a basic model which is used to determine a basic value for the volumetric efficiency, and a correction model which generates an output value that is used to correct the basic value when the values of variables relevant to the volumetric efficiency deviate from reference values of these variables.

Claim 18. (New) The method as claimed in Claim 17, wherein a value that is determined for a fuel quantity is filtered in the determination of the volumetric efficiency.